

Having described our invention, what we claim is:

1. A transverse-mounted drive unit for driving first and second axles of a vehicle, comprising:
 - 5 a housing comprising first and second axially spaced bearings;
a center differential comprising a cage coaxially mounted on the first axle and provided with at least one output member for driving the first axle and a second output member for driving the second axle;
an input gear coaxially coupled to the cage and adapted to be driven by
 - 10 an output gear of a transmission;
first and second bearing sleeves axially extending in opposite directions from the cage, the first bearing sleeve being journaled in the first bearing;
an axial extension connected to the second output member; and
an output gear coupled to the axial extension adapted to mesh with a
 - 15 drive gear connected with the second axle and respectively provided in opposite surfaces with a bearing member seated in the second bearing and a third bearing for receiving the second bearing sleeve.
2. The drive unit of claim 1, wherein the first, second and third bearings are
- 20 tapered roller bearings.
3. The drive unit of claim 2, wherein the effective cones of the second and third tapered roller bearings form the same point.
- 25 4. The drive unit of claim 1, wherein the output gear is supported by an additional bearing seated in one of the housing and cage.
5. The drive unit of claim 1, wherein the first axle comprises first and second axially aligned half-shafts.

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6. The drive unit of claim 5, wherein the center differential comprises first and second planetary gear trains, the first planetary gear train comprising a planet carrier rigidly connected to the cage and provided with planet gears, a sun gear connected to the first half-shaft and an internal gear freely rotatable in the cage, the second planetary gear train comprising an internal gear rigidly connected to the internal gear of the first planetary gear train, a sun gear connected to the second half-shaft and a planet carrier constituting the second output member and comprising at least one pair of meshing planet gears.
- 10 7. The drive unit of claim 1, further comprising an intermediate shaft rotatably journaled in the housing and connected with a spur gear meshing with the output gear and a bevel gear adapted for meshing with a bevel gear connected to a shaft for driving the second axle.
- 15 8. The drive unit of claim 1, wherein the output gear is a bevel gear adapted to mesh with a bevel gear connected to a shaft for driving the second axle.
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